

## ABSTRACT OF THE DISCLOSURE

A process for manufacturing a bipolar type semiconductor device in which at least a part of a region where an electron  
5 and a hole are recombined during current flowing is formed with  
a silicon carbide epitaxial layer that has been grown from the  
surface of a silicon carbide substrate, is characterized by  
that the surface of the silicon carbide substrate is treated  
by hydrogen etching and the epitaxial layer is then formed by  
10 the epitaxial growth of silicon carbide from the treated  
surface. A propagation of a basal plane dislocation to the  
epitaxial layer can be further reduced by treating the surface  
of the silicon carbide substrate by using chemical mechanical  
polishing and hydrogen etching in this order.